## REMARKS/ARGUMENTS

Claims 1-4, 6-18 and 20-23 are pending. Claims 20-22 have been amended, and claims 5 and 19 have been cancelled. Reconsideration is respectfully requested.

# 1. Rejection of Claims 1-23 Under § 102(b)

Claims 1-23 stand rejected under 35 U.S.C. 102(b) as being anticipated by U.S. Patent No. 5,640,143 ("Myron"). The Applicant respectfully traverses this rejection.

Regarding claim 1, this claim recites a room occupancy sensor having 1) a sensor for detecting motion in a room, with a sensitivity to the motion for triggering the room occupancy sensor, and 2) "a device for measuring ambient room temperature, wherein the sensitivity is adjusted in response to the measured ambient room temperature." On page 2 of the office action, the Examiner cites col. 7, lines 26-37 for teaching a temperature measuring device that adjusts the sensor sensitivity in response to the measured ambient room temperature. The Applicant respectfully traverses this statement. The text cited by the Examiner describes a light sensor to prevent the lights from being switched on when the motion sensor senses motion. In fact, a word search for the term "temperature" did not yield any apparent disclosure relating to the adjustment of the motion sensor sensitivity based upon any detected ambient temperature. Therefore, it is submitted that claim 1 is not anticipated by Myron.

Regarding claim 2, it depends from claim 1, and is deemed allowable for the reasons set forth above. Moreover, claim 2 recites the sensitivity is increased as the ambient room temperature increase, which is not taught by Myron. The Examiner states that col. 7, lines 13-25 teach raising the sensitivity as ambient temperature increases, yet this text merely teaches shutting down the microprocessor should a thermistor determine an overheating condition. Therefore, the Applicant respectfully submits that claim 2 is not anticipated by Myron.

Regarding claim 3-23, the Applicant assumes that the Examiner intended to reject just claims "1-2", not claims "1-23", in this first rejection under Myron because the Examiner only mentions claims 1-2 in any detail, and the Examiner was thorough in including a detailed explanation of each rejected claim throughout the rest of the Office Action. The Examiner also

separately rejects claim 5 under Myron. To the extent the Applicant's assumption is untrue, the Applicant traverses this rejection with respect to claims 3-4, 6-18 and 20-23, as Myron does not appear to teach the temperature compensation of claims 3-4 and 18, the controller implemented compensation of claims 6-10, the sensor filter compensation of claims 11-17 and 23, and the sensitivity compensation of claims 20-22.

## 2. Rejection of Claim 5 Under § 102(b)

Claim 5 stands rejected under 35 U.S.C. 102(b) as being anticipated by Myron. Claim 5 has been cancelled, rendering this rejection moot.

# 3. Rejection of Claims 3-4 Under § 103(a)

Claims 3-4 stand rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 5,621,662 ("Humphries") in view of Myron. The Applicant respectfully traverses this rejection.

To establish prima facie obviousness of a claimed invention, all the claim limitations must be taught or suggested by the prior art. In re Royka, 490 F.2d 981, 180 USPQ 580 (CCPA 1974); MPEP 2143.03. It is respectfully submitted that the Examiner has failed to establish prima facie obviousness of the rejected claims because claims limitations recited therein are not taught or suggested by the combination of Humphries and Myron.

Similar to claim 1, claim 3 recites a home automation system having at least one room motion sensor that includes "a sensor for detecting motion in one of the rooms, the sensor having a sensitivity to the motion for triggering the room occupancy sensor, and a device for measuring ambient room temperature, wherein the sensitivity is adjusted in response to the measured ambient room temperature." The Examiner admits that Humphries does not show a motion sensor having a sensitivity that is adjusted in response to measured ambient room temperature. Instead, the Examiner relies on Col. 11, lines 49-62 of Myron for teaching such sensitivity adjustment. Yet, this cited text only teaches adjusting sensitivity based upon motion detections by the sensor. As stated above in Part 1, a word search for the term "temperature" did not yield

any apparent disclosure relating to the adjustment of the motion sensor sensitivity based upon ambient temperature.

Similar to claim 2, claim 4 recites that "the sensitivity is increased as the ambient room temperature increases." The Examiner admits that Humphries does not show increasing sensitivity as the ambient room temperature increases. Instead, the Examiner relies on Col. 7, lines 13-25 of Myron for teaching such sensitivity increase. Yet, as stated above in Part 1, this text merely teaches shutting down the microprocessor should a thermistor determine an overheating condition, which does teach or suggest a sensitivity increase in response to an ambient room temperature increase.

For these reasons, it is respectfully submitted that this rejection should be withdrawn.

## 4. Rejection of Claims 6-10 Under § 103(a)

Claims 6-10 stand rejected under 35 U.S.C. 103(a) as being unpatentable over Humphries in view of Myron. The Applicant respectfully traverses this rejection.

Regarding claim 6, it recites a home automation system having controlled objects, room motion sensors, and "a controller for controlling the controlled objects in response to detected occupancy by the plurality of room motion sensors; wherein at least one of the room motion sensors includes a sensor for detecting motion in one of the rooms, the sensor having a sensitivity to the motion for triggering the room occupancy sensor, and wherein the sensitivity is adjustable in response to signals from the controller." The Examiner admits that Humphries does not teach a motion sensor having a sensitivity that is adjustable in response to the signal from the controller. Instead, the Examiner relies on col. 11, lines 49-62 of Myron for allegedly teaching that the motion sensor's sensitivity is adjustable "in response to signals from the controller." However, this cited text from Myron merely teaches the sensor's microcontroller is adjusting a threshold sensitivity. The sensor's microcontroller is not a controller that controls controlled objects, as recited in claim 6. Therefore, even if the Myron motion sensor were combined with the Humphries home automation system as suggested by the Examiner, there still

is no suggestion of adjusting the motion detector's sensitivity in response to signals from <u>a</u> controller of controlled objects.

Regarding claims 7-10, these claims depend from claim 6, which is deemed allowable for the reasons set forth above. Further, Humphries and Myron fail to teach the limitations recited in these dependent claims as well. For example, claims 8-9 recite the concept of adjusting the sensitivity of a motion detecting sensor in response to other sensors (movement through doorway detected by entry/exit sensor as recited in claim 8, or occupancy of specific location in a room detected by spot sensor as recited in claim 9). The Examiner admits Humphries fails to teach such a concept, but asserts that col. 12, line 9, and col. 14, lines 6-8 of Myron do. The Applicant respectfully disagrees. The cited text merely acknowledged the types of signals that can be achieved by a sensor "mounted near the entrance", without any apparent suggestion that the sensitivity of one sensor is adjusted in response to detected movement/occupancy by another sensor. Likewise, claim 10 recites the concept of adjusting the motion detecting sensor sensitivity in response to a determined parameter by a status sensor. The Examiner relies on col. 11, lines 49-62 of Myron for teaching the adjustment of the occupancy sensor sensitivity "in response to the determined parameter by the sensor". However, this is not what claim 10 recites. The cited text concerns adjusting a sensor's sensitivity in response to its own detections. not in response to a parameter determined by another sensor as recited by claim 10.

For these reasons, it is respectfully submitted that this rejection should be withdrawn.

## 5. Rejection of Claim 11 Under § 103(a)

Claim 11 stands rejected under 35 U.S.C. 103(a) as being unpatentable over Humphries in view of US Patent 5,946,209 ("Eckel"). The Applicant respectfully traverses this rejection.

Claim 11 recites an occupancy sensor that includes "a sensor for detecting motion in a room, and a <u>filter mechanism</u> for triggering the room occupancy sensor only in response to repeated motion detections by the sensor that exceed a predetermined number, that are each separated apart by a predetermined separation time period, and that all occur within a predetermined group time period." The Examiner admits that Humphries fails to teach the

claimed filter mechanism, but states that Eckel does. The Applicant respectfully disagrees. Eckel in fact teaches programming microprocessor 70 to operate in a tolerant zone, which requires the motion sensor output signal to be characterized by a greater magnitude, duration, frequency, duty cycle or slew rate (see col. 23 lines 26-64). These parameters from Eckel are distinguishable from, and inferior to, the parameters used by the claimed filter mechanism, which uses the combination of *number* (of detections), *separation time period* (between detections), and *group time period* (within which detections must occur) to trigger the motion sensor (as explained on page 10, lines 12-32 of the specification). It has been found that this combination of parameters significantly reduces the instances of false positives, and the combination of Humphries and Eckel simply do not contemplate utilizing the claimed combination of parameters to trigger a motion sensor.

The Examiner states col. 23, lines 10-37 of Eckel teach the claimed filter mechanism. The Applicant respectfully traverses this conclusion. This text from Eckel merely describes a waiting period for the microprocessor during testing, and the use of tolerant and intolerant zones based on the time of day. The concepts of detection number, separation time period and group time period are simply not taught or suggested by test waiting periods or time of day.

For these reasons, it is respectfully submitted that this rejection should be withdrawn.

## 6. Rejection of Claims 12-14 and 16 Under § 103(a)

Claims 12-14 and 16 stand rejected under 35 U.S.C. 103(a) as being unpatentable over Humphries in view of Eckel. The Applicant respectfully traverses this rejection.

Similar to claim 11, claim 12 recites a home automation system using a filter mechanism for triggering the room motion sensor "only in response to repeated motion detections that exceed a predetermined number, that are each separated apart by a predetermined separation time period, and that all occur within a predetermined group time period." Thus, for the reasons set forth above in Part 5 with respect to claim 11, it is respectfully submitted that claim 12 is not rendered obvious by Humphries and Eckel.

Claims 13-14 and 16 depend upon allowable claim 12, and are therefore considered allowable as well. Further, the combination of Humphries and Eckel fails to teach or suggest the elements of these dependent claims. For example, claim 14 recites that the controller for the controlled objects "counts the number of the repeated motion detections, determines the time separation between the repeated motion detections, and determines the time period in which all the repeated motion detections occur; and the controller determines that the room motion sensor is triggered when the counted motion detections exceed the predetermined number, are separated apart by the predetermined separation time period, and all occur within the predetermined group time period." As stated above in Part 5, the portions of Eckel relied upon by the Examiner simply do not contemplate using the combination of detection number, time separation and group time period as recited in claim 14.

Claims 16 recites adjusting at least one of these parameters (number, time separation, group time period) in response to detected movement by a spot sensor. The Applicant traverses the rejection of these claims for the reasons set forth above in Part 4 with respect to claims 8-9 (Humphries fails to teach or suggest changing the sensitivity of one sensor based upon detected movement/presence by another sensor, and the addition of Eckel fails to cure the deficiencies of Humphries), and in Part 5 above with respect to claim 11 (Humphries and Eckel do not teach or suggest a filter mechanism for a motion sensor utilizing a predetermined *number*, predetermined *time period* and predetermine *group time period* for triggering that motion sensor). Humphries and Eckel simply fail to suggest modifying the *number*, *time period* and *group time period* for a motion sensor, let alone in response to detected movement by a spot sensor as recited in claim 16.

For these reasons, it is respectfully submitted that this rejection should be withdrawn.

#### 7. Rejection of Claims 15 and 17 Under § 103(a)

Claims 15 and 17 stand rejected under 35 U.S.C. 103(a) as being unpatentable over Humphries in view of Eckel and Myron. The Applicant respectfully traverses this rejection.

Claims 15 and 17 depend from claim 12, which is deemed allowable for the reasons set forth above in Part 6 with regard to claim 12. In addition, the references cited by the Examiner fail to teach or suggest the elements of claims 15 and 17. Specifically, claims 15 and 17 recite adjusting at least one of the filter mechanism parameters (number, time separation, group time period) in response to detected movement by an entry/exit sensor (claim 15) or a status sensor (claim 17). The Applicant traverses the rejection of these claims for the reasons set forth above in Part 4 with respect to claims 8-9 (Humphries and Eckel do not teach or suggest changing the sensitivity of one sensor based upon detected movement/presence by another sensor, and the addition of Myron fails to cure such deficiencies), and in Part 5 above with respect to claim 11 (Humphries and Eckel do not teach or suggest a filter mechanism for a motion sensor utilizing a predetermined *number*, predetermined *time period* and predetermine *group time period* for triggering that motion sensor, and the addition of Myron fails to cure such deficiencies). Humphries, Eckel and Myron simply fail to suggest modifying the *number*, *time period* and *group time period* for a motion sensor, let alone in response to detected movement by an entry/exit sensor or a status sensor as recited in claims 15 and 17.

For these reasons, it is respectfully submitted that this rejection should be withdrawn.

# 8. Rejection of Claim 18 Under § 103(a)

Claim 18 stands rejected under 35 U.S.C. 103(a) as being unpatentable over Humphries in view of Myron. The Applicant respectfully traverses this rejection.

Similar to claim 1, claim 18 recites a method of automated control that includes controlling the controlled objects in response to detected occupancy by the plurality of room motion sensors, measuring ambient room temperature, and "adjusting a sensor trigger sensitivity of at least one of the room motion sensors in response to the measured ambient room temperature." Thus, for the reasons set forth above in Part 1 with respect to claim 1, it is respectfully submitted that claim 18 is not rendered obvious by Humphries and Myron. Unlike the rejection of claim 1, this rejection cites different text (col. 7, lines 13-25) from Myron for allegedly teaching sensitivity compensation based upon temperature. However, as stated above

with respect to the rejection of claim 2, this cited text from Myron simply teaches shutting down the microprocessor should a thermistor determine an overheating condition.

For these reasons, it is respectfully submitted that this rejection should be withdrawn.

# 9. Rejection of Claims 19-22 Under § 103(a)

Claims 19-22 stand rejected under 35 U.S.C. 103(a) as being unpatentable over Humphries in view of Myron. Claim 19 has been cancelled, and claims 20-22 have been amended into independent form. The Applicant respectfully traverses this rejection with respect to claims 20-22.

Similar to claims 8-10, claims 20-22 recite the concept of adjusting the trigger sensitivity of a room motion sensor *in response to other sensors* (movement through doorway detected by entry/exit sensor as recited in claim 20, occupancy of specific location in a room detected by spot sensor as recited in claim 21, or a home parameter determined by a status sensor as recited in claim 22). Thus, for the reasons set forth above in Part 4 with respect to claims 8-10, it is respectfully submitted that claims 20-22 are not rendered obvious by Humphries and Myron, and that the rejection of these claims should be withdrawn.

#### 10. Rejection of Claim 23 Under § 103(a)

Claim 23 stands rejected under 35 U.S.C. 103(a) as being unpatentable over Humphries in view of Eckel. The Applicant respectfully traverses this rejection.

Similar to claim 11, claim 23 recites a method of automated control that includes triggering one of the room motion sensors only "in response to repeated motion detections that exceed a predetermined number, that are each separated apart by a predetermined separation time period, and that all occur within a predetermined group time period", and controlling at least one controlled object in response to the triggered room motion sensor. Thus, for the reasons set forth above in Part 5 with respect to claim 11, it is respectfully submitted that claim 23 is not rendered obvious by Humphries and Eckel, and that the rejection of this claim should be withdrawn.

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For the foregoing reasons, it is respectfully submitted that the claims are in an allowable form, and action to that end is respectfully requested.

Respectfully submitted,

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Dated: A

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